21. (New) A method for improving skin appearance, the method comprising: locating a target area of skin to be cosmetically enhanced;

introducing an amount of ultrasound energy and propagating the ultrasound energy nonlinearly into a dermis layer of the target area;

allowing the ultrasound energy to be absorbed by the dermis layer such that the dermis layer is stimulated or irritated sufficiently to induce new connective tissue formation; and changing a smoothness of an epidermis layer of the skin.



- 22. (New) The method of claim 21, wherein the step of introducing includes applying a focused beam of ultrasound energy into the dermis layer.
- 23. (New) The method of claim 22, wherein the focused beam of ultrasound energy comprises acoustic pulses.
- 24. (New) The method of claim 21, wherein the amount of ultrasound energy is effective to mechanically disrupt the dermis layer of the target area of skin.
- 25. (New) The method of claim 24, wherein the dermis layer is mechanically disrupted with shock waves.
- 26. (New) The method of claim 24, wherein the dermis layer is mechanically disrupted by cavitation.
- 27. (New) The method of claim 21, wherein the step of stimulating or irritating the dermis layer includes the step of elevating the temperature of the dermis layer.
- 28. (New) The method of claim 21, wherein the step of stimulating or irritating the dermis layer includes the step of denaturing the proteins in the dermis layer.
 - 29. (New) The method of claim 21, wherein the target area of skin includes a wrinkle.

Atty. Docket No. 101646-6

Application Serial No.: 10, 005,040

30. (New) The method of claim 22, further comprising the step of scanning the focused beam of ultrasound energy over the target area.

31. (New) The method of claim 21, wherein the step of introducing includes delivering a spatially uniform dosage of ultrasound energy into the dermis layer.

32. (New) The method of claim 21, further comprising the step of cooling the target area f skin.

33. (New) An apparatus for improving skin appearance comprising:
an ultrasound transducer for transmitting acoustic waves into a dermis layer of skin; and
a control device constructed and arranged to control the transducer and induce non-linear
propagation of ultrasound energy into the dermis layer sufficient to induce new connective tissue
formation.

- 34. (New) The apparatus of claim 33, wherein the control device is constructed to deliver a spatially uniform dosage of ultrasound energy to the dermis layer.
 - 35. (New) The apparatus of claim 33, further including an acoustical waveguide.
- 36. (New) The apparatus of claim 33, wherein the ultrasound transducer is a phased array ultrasound transducer.